NEW USE FOR WATER-WORKS.—A rather novel source of mechanical power, and curious application of that power, have lately been adopted at Newcastle, on the quay of which a hydraulic crane, worked by the pressure of water in the common street water-pipes, has been erected, under the partial protection of a patent, by Mr. W. Armstrong. The pillar and jib alone appear above ground, and the application of the power to the instrument, in all its movements, is regulated with rapidity, as well as delicacy, by means of indicators, traversing circularly on engraved plates or indexes. Though not the first time that water-works have been applied in the accumulation of mechanical power, this rather elegant application of it to the ordinary business of a town, opens up a wide vista, through which may be traced the indefinite outline of multiform uses for such a convenient power, in the sphere of domestic as well as of business life.

THE ROOF OF WESTMINSTER HALL.—The celebrated roof of Westminster Hall, the span of which is among the greatest ever built without pillars, is little more than one-third the width of the Worksop Spread-oak, the branches of which would reach over Westminster Hall, placed on either side of its trunk, and have 32 feet to spare; and its extent is nearly 30 feet more than the length, and almost four times the width of Guildhall, in the city of London. The rafters of Westminster Hall, though without pillars, have massive walls on each side to support them; but the tree-boughs, of 16 feet more extent, are sustained at one end only. Architects, who know the stress a staircase, of even 8 or 10 feet in width, has upon the wall into which the side is built, can alone fairly estimate the excessive purchase which branches on either side, spanning from outbough to outbough 180 feet, must have on the central trunk.—*The Plough.*

SCHOOL OF DESIGN.—Not merely members within the walls, but every eminent artist who as yet has had a glimpse of the school, is equally opposed to the system of management. Mr. Redgrave, A.R.A., who officiated temporarily a few months back in the figure class, has addressed a letter to the premier, strongly pointing out the defects observable in the conduct of the institution.

ROYAL ACADEMY.—Mr. E. M. Ward was elected an associate at a meeting of Academicians on the 2nd. Complaints are made that other real vacancies were not filled up.

## NOTICES OF CONTRACTS, &c.

THE authorities of the Stamp Office having given us notice to discontinue the insertion of our list of contracts, &c., excepting as advertisements, we, in deference to their wishes, omit them for the present, but have taken steps to place the facts of the case properly before them, and, as we hope, remove their objections. In the meantime a list may be seen at our office.

## TO CORRESPONDENTS.

"*Architects' School of Design.*"—Various letters on the subject shall receive consideration.

"*A. S.*"—The architect as your agent can bind you. If he act wrongly your remedy is against him.

"*Country Subscriber.*"—The depôt is in the Quadrant, Piccadilly, next door to the County Fire Office.

"*Delta.*"—Laxton's will answer your purpose.

"*Constant Reader of the Builder.*"—The chances are that neither one nor the other would keep down the water in such a case.

"*Amateur*" shall appear.

"*Citizen.*"—His request shall be attended to in respect of future communications.

"*C.*" may rely on our never losing sight of the necessity of preserving open grounds for the use of the people. We will yield nothing quietly without a fair return.

"*Inquirer.*"—A correspondent asks for information "about a machine for making carriage-wheels of wood; the address of the party who makes the same; likewise what instrument is most approved off for enlarging or diminishing and copying drawings instead of the pentagraph; at the same time would like to know if any company or manufactory has used or lighted their premises with gas made from the Comte de Val Marino's plan, as introduced by him into London in the year 1849."

"*Philo-Kerr.*"—The price is 5s.

"*J. W.*"—The price of the Encyclopædia is 2*l.* 12*s.* 6*d.*

*Received.*—"A Country Reader," "Subscriber" (U.), "T. E. Carnegie," "Subscriber," re Holborn Hill, "Cosmopolite," "S. P.," "Amicus," "H. J. L.," "F. H.," "People's Journal" for November, "Ignes de Castro," "Pictorial Gallery of Arts" (Sculpture) Knight, "British Worthies," "Patent Journal," "A Manual of Gothic Architecture," by F. A. Paley, M.A. (Van Voorst, Paternoster-row.)

*** Correspondents are requested to address all Communications to the EDITOR, 2, York-street, Covent-garden.


## ADVERTISEMENTS.

DRUCE'S No. 2, WHARF, late Paradise-wharf, Chelsea.

TO THE TRADE.—Parties desirous of delivering Timber Deals, Stone, Bricks, or any other goods, in the districts of Chelsea, Brompton, Fulham, Kensington, &c. &c., will find great facilities of Wharfage, Cranage, or Delivery, by applying as above. A weight-bridge and draw-dock.—N.B.—Depot for Glass Pantiles.

FIRE BRICKS, Stourbridge, Welsh, and Newcastle; also Lumps, Tiles, and Clays, a large Stock of the best made Goods are selling at very reduced prices (a great reduction having taken place in freights) at WARD'S Honduras Wharf, Bankside. Windsor Nonsuch, and Town-made Oven Tiles, PF.N. and Circular Red Fire Bricks, Country Pan, Plain and Ridge Tiles, Paving Bricks, Corn Drying and Patent Malting Tiles.—Country Builders promptly supplied. Rough River Ballast for Concrete and Thames Sand, above and below bridge, by freights or loads. Prepared Sand for Plastering.

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| Genuine White Lead .... | per cwt. | 27s. 6d. |
| Seconds ..... | ,, | 25 0 |
| Thirds ..... | ,, | 23 0 |
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Varnishes equalled by none:

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| ,, Copal ..... | ,, | 16 |
| ,, Body Copal ..... | ,, | 24 |
| ,, Gold Size ..... | ,, | 10 |
| ,, Black Japan ..... | ,, | 10 |

Painters' Brushes, and every article in this branch, at the Manufactory, 87, Bishopsgate-street, Without, London.—THOMAS MILLINGTON, Proprietor.

WALLIS'S PATENT LIQUID WOOD KNOTTING.—This newly-discovered Liquid Composition which Messrs. Geo. and Thos. Wallis have the satisfaction of introducing to the trade, possesses the important qualification of effectually stopping Knots in Wood, however bad, and preventing them eating through and disfiguring the paint above.

Many substances have been used and much time spent in endeavouring to find a cure for a bad Knot, but hitherto without success. Messrs. Wallis therefore feel much pleasure in offering to the public an article so long and anxiously called for.

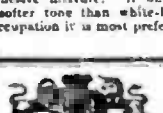
In the application, skill is not required; it is put on to the work with a brush like common paint, can be used in all climates and situations, and does not require heat.

Sold wholesale and retail, by Messrs. G. and T. Wallis, Varnish, Japan, and Colour Manufacturers, No. 64, Long Acre. Price 16s. per gallon.

TODD'S PATENT PROTOXIDE PAINT, manufactured by CHAS. FRANCIS and SONS, CEMENT WORKS, NINE ELMS, LONDON.

The properties of this Paint are peculiar for preventing iron from oxidation, wood from decay, and masonry from damp; it neither cracks nor blisters with the hottest sun, and is therefore most valuable for Railways, Boilers, Steam, Gas, and Water-pipes; Hothouses, Forcing-houses, and for Shipping. Its adhesion is so great to iron and wood, that the hardest friction will scarcely remove it. It prevents vegetation on stuccoed buildings, and is not affected by spray of sea-water.

PROTOXIDE PAINT is sold ground in oil, and, compared with white-lead, its property of concealing is as 75 to 50, so that one hundred weight is equal to one and a half of lead. It works well under the brush, and forms with oil an unctuous and cohesive mixture. If blended with other paints it has a softer tone than white-lead. For houses painted during occupation it is most preferable, being perfectly innocuous.



TO ENGINEERS AND BOILER MAKERS.
LAP-WELDED IRON TUBES FOR STEAM BOILERS.

THE BIRMINGHAM PATENT IRON TUBE COMPANY, 42, Cambridge-street, Birmingham, and Smethwick, Staffordshire, manufacture Tubes under an exclusive License from Mr. Richard Prosser, the Patentee. These Tubes are now very extensively used in the Boilers of Marine and Locomotive Steam Engines in England and on the continent, are stronger, lighter, cheaper, and more durable than brass or copper Tubes, and warranted not to open in the Weld. They may be fixed in the Boilers without Ferules, and can be taken out and refixed without additional trouble or expense.—Address, 42, Cambridge-street, Crescent, Birmingham; London Warehouse, 6a, Upper Thames-street.

PATENT ARCHITECTURAL ROOFING TILES.—Architects, Builders, Railway Contractors, and others, may now be supplied with these very superior and truly ornamental Roofing Tiles, at the London Depôt, Essex Wharf, Strand, at the undermentioned prices. These Tiles, for security, beauty, and effect, surpass every other kind of roofing, and are equally adapted to the covering of Ecclesiastical, and other ornamental buildings of more modern architecture. They will be found far more effectual and handsome as a covering than slate, and equally cheap: and they do not subject the adjoining rooms to such extremes of heat and cold, nor occasion wet to run down within the roof, caused by condensation upon slating. These Tiles are laid on laths, like common pantiles; and although forming a perfectly close covering, admit of being effectually repaired with the greatest facility. Arrangements are in progress by the Company for providing a supply of these Tiles throughout the different counties of England in the ensuing season, and orders will be taken by the Agent for these Tiles, of a dark blue, grey, or lead colour, to be delivered in the spring, according to samples.—Prospectuses may be obtained of the Company's Secretary, at the Offices, 138, Strand, London, to whom applications for Licences should be addressed, by persons desirous of manufacturing these Tiles, for which a very superior press is provided, at moderate cost.

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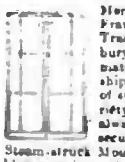
HERRING'S PATENT SAFETY WINDOWS.—No invention ever offered the advantages to builders and the public: it will positively add 5 to 10 per cent. to all houses having it, repay the cost every two years, abolish all danger to life and limb, cleaning and repairing. It is in full operation (four different ways), forms a complete ventilator and sun-blind, all simple, cheap, and effective.—Apply for licenses and to inspect its real merits, to Herring's Patent Steam Bed-feather Factory, 14, Aggregate-street, London.

CHAS. WM. WATERLOW,



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TO THE PLATE GLASS TRADE.

THE BIRMINGHAM PLATE AND CROWN GLASS COMPANY, "Registered," beg to inform the Trade and Public, that the extension of their Works at Smethwick, near Birmingham, being now completed, their Warehouse, 141, Fleet-street, London, is now open for the Sale of their Crystal Plate Glass, which will be found to stand unrivalled by that of any other manufactory. They are also in a position to supply Rough Plate of any substance for Skylights or Floorings on the shortest notice.—Orders addressed to H. MOSS, Company's Warehouse, 141 Fleet-street, London, will be promptly attended to.

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Dry and Good Colours of the best quality; Brushes Dryers, and every article used in the Trade Warranted.
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